



National Weather Service

Storm Data and Unusual Weather Phenomena



May 2000

Location	Date	Time Local/ Standard	Path Length (Miles)	Path Width (Yards)	Number of Persons Killed Injured	Estimated Damage Property Crops	Character of Storm
<u>MICHIGAN, East</u>							
Huron County 3 NNE Caseville	08	2315EST			0 0	2K	Thunderstorm Wind (G52)
Bay County Kawkawlin	09	0015EST			0 0	5K	Thunderstorm Wind (G52)
Huron County Sebewaing	09	0050EST			0 0	2K	Thunderstorm Wind (G52)
Genesee County Genesee	09	0137EST			0 0	2K	Thunderstorm Wind (G50)
Washtenaw County 2 SE Chelsea	09	0235EST			0 0	25K	Thunderstorm Wind (G60)
Washtenaw County 2 S Ann Arbor to Ypsilanti	09	0245EST 0255EST			0 0	30K	Thunderstorm Wind (G55)
Wayne County Allen Park to Lincoln Park	09	0300EST 0302EST			0 0	12K	Thunderstorm Wind (G52)
Wayne County 10 NW Detroit	09	0300EST			0 0	2K	Thunderstorm Wind (G50)
Macomb County St Clair Shrs	09	0310EST			0 0	12K	Thunderstorm Wind (G55)
Wayne County Grosse Pt to Grosse Pt Farms	09	0310EST			0 0	15K	Thunderstorm Wind (G55)
St. Clair County Algonac	09	0325EST			0 0	4K	Thunderstorm Wind (G52)
<p>A low pressure system moved east across the northern Great Lakes, and an associated cold front reached Lake Michigan during the overnight hours. Warm, moist air moved north into the central Great Lakes ahead of the cold front. Thunderstorms erupted at night across lower Michigan, well ahead of the cold front. Several became severe, producing damaging wind gusts.</p> <p>Most of the damage was in the form of trees, tree limbs, and power lines downed. The most substantial damage was in Washtenaw County. A home in Lima Township (just southeast of Chelsea) had its roof torn off; the roof landed on a nearby car. In Ann Arbor, falling trees crushed two cars. All told, over 40,000 people in southeast Michigan lost power at some point during the storms. But the worst storms of the day were still to come.</p>							
Lenawee County Hudson	09	1830EST			0 0	16K	Thunderstorm Wind (G52)
Lenawee County Morenci	09	1830EST			0 0	35K	Thunderstorm Wind (G55)
Wayne County Taylor to Allen Park	09	1835EST 1846EST			0 0		Hail (1.00)
Lenawee County 5 W Adrian to 3 E Onsted	09	1840EST 1846EST			0 0		Hail (1.00)
Lenawee County Adrian to Blissfield	09	1846EST 1900EST			0 3	960K	Thunderstorm Wind (G70)
Lenawee County Onsted to 2 N Tipton	09	1848EST 1855EST			0 0	20K	Thunderstorm Wind (G52)



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Lenawee County Tecumseh	09	1900EST			0	0			Hail (1.75)
Lenawee County Tecumseh to Clinton	09	1900EST 1905EST			0	0	125K		Thunderstorm Wind (G74)
Wayne County Detroit	09	1905EST			0	0			Hail (1.75)
Washtenaw County Saline to Ypsilanti	09	1906EST 1919EST			0	0			Hail (3.00)
Monroe County Maybee to Carleton	09	1920EST 1930EST			0	0	35K		Thunderstorm Wind (G65) ^M
Washtenaw County Milan to 4 WSW Ypsilanti	09	1924EST 1938EST			0	0	525K		Thunderstorm Wind (G60)
Washtenaw County Dexter to Ann Arbor	09	1926EST			0	0	20K		Thunderstorm Wind (G52)
Monroe County Petersburg to Azalia	09	1930EST 1940EST			0	0	80K		Thunderstorm Wind (G60)
Livingston County 4 SE Brighton	09	1933EST			0	0			Thunderstorm Wind (G52)
Wayne County Plymouth	09	1933EST 1937EST			0	0			Hail (1.75)
Wayne County Plymouth to Westland	09	1933EST 1945EST			0	0	135K		Thunderstorm Wind (G60)
Oakland County South Lyon	09	1935EST			0	0	35K		Thunderstorm Wind (G55)
Oakland County 2 SE New Hudson to Milford	09	1938EST 1948EST			0	0	85K		Thunderstorm Wind (G60)
Washtenaw County 5 N Ypsilanti	09	1940EST			0	0	8K		Thunderstorm Wind (G52)
Wayne County 4 S Belleville to Detroit Metro Arpt	09	1945EST 2000EST			0	0	6.1M		Thunderstorm Wind (G60)
Wayne County Garden City to Redford	09	1949EST 1955EST			0	0	60K		Thunderstorm Wind (G55)
Oakland County Highland	09	1953EST			0	0			Hail (0.75)
Oakland County Highland to White Lake	09	1953EST 2005EST			0	0	15K		Thunderstorm Wind (G62)
Oakland County Farmington	09	1954EST			0	0	15K		Thunderstorm Wind (G52)
Wayne County Flat Rock to Southgate	09	1955EST 2000EST			0	0	108K		Thunderstorm Wind (G60)



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Wayne County							
Allen Park to 5 WNW Detroit	09	2000EST 2006EST			0 3	755K	Thunderstorm Wind (G65)
Oakland County							
2 E Orchard Lake Vlg to 2 E Pontiac	09	2001EST 2015EST			0 0	100K	Thunderstorm Wind (G55)
Oakland County							
Waterford to Clarkston	09	2010EST 2016EST			0 0	55K	Thunderstorm Wind (G55)
Macomb County							
Washington	09	2032EST			0 0	2K	Thunderstorm Wind (G50)
St. Clair County							
4 W Marine City	09	2047EST			0 0	2K	Thunderstorm Wind (G50)

A strong cold front moved slowly south across southeast Michigan during the afternoon and evening of the 9th. Thunderstorms developed in the warm, humid air out ahead of the cold front. A number of these became severe, producing the worst severe thunderstorm outbreak in metro Detroit in almost two years.

The thunderstorms took two forms on this day. Widely scattered supercells developed across southeast Michigan, south of Interstate 69. These rotating thunderstorms produced numerous funnel clouds, but no confirmed tornadoes. However, some of these storms produced very large hail. Hailstones as large as oranges were reported in Ypsilanti. The Detroit Tiger baseball game at Comerica Park was interrupted by golfball sized hail. The game was eventually rained/hailed out. Golfball sized hail was also reported in Tecumseh and Plymouth. Some sporadic wind damage also occurred with these storms, downing trees and power lines. However, the stronger winds were to come later.

A line of thunderstorms developed in northern Illinois and Indiana, and moved northeast at almost 70 mph. This line of storms overtook the supercells as it moved into southeast Michigan, and produced widespread wind damage. Some of the most significant damage follows:

In Lenawee County: A barn was destroyed in Hudson. Several vehicles were damaged by fallen trees in Morenci and Adrian. Blissfield experienced some of the worst damage: a mobile home was flipped, injuring the two occupants (one of whom had broken ribs and a punctured lung); another man suffered electrical injuries when a falling power line struck him; an RV was overturned; store signs were destroyed; a garage collapsed; several homes were damaged by fallen trees, including one landmark home heavily damaged; at a local ball field, a scoreboard was destroyed, a dugout deroofed, and metal bleachers tossed; and large steel grain bins were destroyed. A hangar at nearby Betz Airport collapsed, crushing an airplane. Two other hangars were damaged. In Sand Lake, a hay barn and a corral were blown down. Tecumseh was also hard hit: a storage structure at a lumber yard was destroyed; part of an inn was deroofed; and numerous homes and vehicles were damaged by fallen trees.

Dozens of trees were downed in Monroe County. A spotter measured a 75 mph gust in Maybee, where a glass patio table was tossed from a porch to the back yard (without breaking!). A trailer was blown over at a Dundee construction site, where a large tree damaged a car, home, and shed when it fell. In Petersburg, a falling tree crushed an historic (over 150 year old) railroad depot.

Wind damage was also widespread in Washtenaw County. In Milan, a garage was blown down, and eight vehicles were struck by falling trees. A grocery store in Ann Arbor had its front doors blown off. Ypsilanti was hardest hit: several hundred trees were downed, damaging a home, slicing a camper van in half, and crushing a garage and a car; a fire station was partially deroofed; and a church steeple was destroyed.

In Wayne County: The west and southwest sides of the city of Detroit saw damage, with windows shattered, roofs peeled up, and chimneys knocked over. At the intersection of Tireman and Rangoon, a car was flipped, injuring the two occupants; a nearby factory was deroofed, with a 13 year old boy injured by flying debris. At Detroit Metro Airport, a 55 mph gust was measured; a Mesaba Airlines hangar was destroyed, and a plane inside was damaged. Power poles were broken in Flat Rock. In New Boston, store fronts were damaged, with many trees uprooted. At Mettetal Airport near Plymouth, a plane was flipped. Scores of trees were downed in Westland, damaging a truck and a home, and breaking windows. In Redford, a falling tree destroyed a swimming pool and damaged a garage. Woodhaven saw a garage destroyed and a second displaced; a warehouse roof was damaged; a home was deroofed; street signs were downed; and a wood board was embedded in the side of a house. A school in Livonia had its air conditioning units blown over, and the walls of a connecting corridor were displaced. Two homes in Dearborn were condemned after tree damage; another home was shifted off its foundation; a garage was destroyed; and a building was deroofed, with roofing debris damaging two nearby cars. An outbuilding was demolished by falling trees in Sumpter Township.

Oakland County was the other county that saw widespread damage. A 64 mph wind gust occurred in White Lake. Winds to 70 mph deroofed a trailer home in Highland. In Milford, falling trees crushed a car and damaged a home. Farmington saw a garage



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MICHIGAN, East

damaged by a tree, and phone poles were snapped. In Novi, a trailer at a construction site was destroyed, with another trailer and a wall under construction sustaining damage; the air conditioning units on the roof of a business were ripped off. Power poles were snapped in Auburn Hills. Dozens of trees were downed in Pontiac, destroying a garage and damaging several homes. In Bloomfield Township, a trampoline was destroyed, and a home was damaged by a falling tree. Waterford saw an animal shelter destroyed, another damaged; over 150 trees were damaged; and a picnic pavilion was also damaged

Damage in the other counties was much less widespread, and was generally limited to tree limbs and power lines going down. All told, over 200,000 people lost power at some point, and thousands of insurance claims were filed over the coming weeks. Many schools were closed the next day due to damage or power outages; some schools and businesses did not reopen for several days

Washtenaw County 3 SW Chelsea	11	1545EST			0	0			Hail (0.75)
Washtenaw County 2 S Ypsilanti	11	1630EST			0	0			Hail (0.75)
Washtenaw County Ann Arbor	11	1646EST			0	0			Hail (0.75)
Wayne County Northville	11	1655EST			0	3			Lightning
Wayne County Belleville	11	1702EST			0	0			Hail (0.75)
Wayne County Dearborn Hgts	11	1757EST			0	1			Lightning

Low pressure in the plains sent warm, moist air north into the Great Lakes. With the main warm front still well to the south, surface temperatures stayed cool; the warm, moist air was aloft. Thunderstorms developed in the afternoon, and fed off the juicy air above the surface. Because the atmosphere at the surface was cool and stable, no strong winds were observed with any of the storms. However, the strongest storms produced marginally severe hail

Lightning was an even larger threat. Lightning struck at a soccer field on Six Mile Road near Haggerty in Northville. A group was heading off the field as the storm approached, but some did not make it. Several adults and children were knocked off their feet by the struck, but only one - a twelve year old boy - required hospitalization. Later in the evening, lightning struck a tree in Dearborn Heights. A large limb broke off, and struck a man working nearby. He was hospitalized with a collapsed lung and several broken bones.

Bay County Bay City	12	1630EST 1643EST			0	0			Hail (0.88)
Bay County 4 E Bay City	12	1710EST			0	0			Hail (2.75)
Tuscola County Unionville	12	1716EST			0	0			Hail (1.75)
Huron County 1.5 SSW Sebewaing to Sebewaing	12	1723EST 1725EST			0	0			Hail (2.75)
Huron County 2.8 NNW White Rock to 2.8 N White Rock	12	1850EST	0.3	175	0	0	60K		Tornado (F1)
Livingston County Fowlerville	12	2041EST			0	0	2K		Thunderstorm Wind (G52)



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MICHIGAN, East

Huron County							
Pigeon to Elkton	12	2100EST 2345EST			0 0	35K	Flash Flood
Livingston County							
Hartland	12	2110EST			0 0	6K	Thunderstorm Wind (G52)
Oakland County							
2 E Clarkston	12	2112EST			0 0	6K	Thunderstorm Wind (G52)
Oakland County							
Wixom	12	2112EST			0 0	2K	Thunderstorm Wind (G50)
Oakland County							
Novi	12	2115EST			0 0		Hail (0.75)
Macomb County							
3 W Ray Center	12	2130EST			0 0	4K	Thunderstorm Wind (G52)
Wayne County							
Westland	12	2131EST			0 0		Hail (0.75)
Wayne County							
Detroit	12	2150EST			0 0		Hail (0.88)
MIZ049							
	Huron						
	12	2345EST			0 0	20K	Flood
	13	0900EST					

A warm front moved north across lower Michigan on the 12th, ushering in another warm, muggy, unstable air mass. Thunderstorms developed northeast of Grand Rapids in the afternoon, then moved east toward the Saginaw Valley and Thumb areas. One storm evolved into a classic supercell, producing baseball sized hail from just east of Bay City to near Sebewaing. The supercell continued east across Huron County, and produced the first tornado of the severe weather season a few miles north of White Rock. Many trees were downed near the Lake Huron shoreline, with some downed onto homes. A storage shed was blown into a neighbor's yard, a swimming pool was destroyed, and several canoes were damaged.

Several other storms moved across Huron County, dumping up to 5 inches of rain in some parts of the county. Flash flooding resulted in the Pigeon/Elkton area. A trailer park in Elkton had to be evacuated as the Pinnebog River quickly rose out of its banks. Water rose as high as the electric meters on some of the mobile homes. High water lingered in the county through the night, with flooding along the Willow River in Bloomfield Township (Redman Road was closed for a time), and street flooding in Harbor Beach.

Additional storms developed further south in the evening, and moved east across metro Detroit. These storms produced marginally severe hail, and sporadic wind damage in the form of downed trees and power lines.

Washtenaw County							
Saline	18	0900EST			0 0	40K	Lightning
Oakland County							
7 N Rochester Hills	18	0920EST			0 0		Hail (0.75)
Macomb County							
Washington	18	0925EST			0 0		Hail (0.75)
Wayne County							
Detroit Metro Arpt	18	1000EST			0 9		Lightning



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MICHIGAN, East									
Genesee County									
3 SW Linden to Argentine	18	1253EST 1355EST			0	0			Hail (1.00)
Oakland County									
Holly	18	1305EST			0	0			Hail (0.75)
Oakland County									
Clarkston	18	1310EST			0	0			Hail (1.25)
Livingston County									
Cohoctah	18	1314EST			0	0			Hail (1.00)
Macomb County									
Washington	18	1340EST			0	0			Hail (0.75)
Macomb County									
4 NW New Baltimore	18	1345EST			0	0			Hail (0.75)
Livingston County									
Hartland	18	1455EST			0	0			Hail (0.75)
Lenawee County									
Countywide	18 19	1500EST 0400EST			0	0	20K		Flood
Monroe County									
Countywide	18 19	1500EST 0400EST			0	0	30K		Flood
Oakland County									
Highland	18	1507EST			0	0			Hail (1.00)
Washtenaw County									
Salem	18	1545EST			1	0	2K		Thunderstorm Wind (G50)

A cold front moved slowly south across southeast Michigan on the morning and afternoon of the 18th. Thunderstorms developed along and ahead of the front. A number of these became severe, producing marginally severe hail. The largest hail report was half-dollar sized in Clarkston.

The storms produced a healthy amount of lightning. A strike in Saline caused fire damage to a home there. At Detroit Metro Airport, lightning struck the steel superstructure of a new terminal under construction. Nine workers were injured when the bolt struck, and two required an overnight hospital stay.

At the tail end of the episode, a stray thunderstorm wind gust downed a large tree at Braeburn Golf Course in Salem. The tree fell on a golfer, and he died of his injuries while being transported to the University of Michigan Hospital.

The storms also produced quite a bit of rainfall. The highest rainfall amount, 4 inches, was recorded in the city of Monroe. Small creeks and streams, and urban areas, saw some flooding develop in the afternoon. Flood waters lingered into the next morning, with some rutting of rural roads, and flooding of yards along the smaller creeks. Minor river flooding also resulted over the next few days (see below).

MIZ053-060-082

Saginaw - Shiawassee - Lenawee

19	1330EST	0	0	Flood
21	0300EST			

Up to 4 inches of rain fell from the storms on the 18th. Minor river flooding resulted in the Shiawassee and River Raisin basins



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		Local/ Standard	Length (Miles)	Width (Yards)	Killed	Injured	Property	Crops	

MICHIGAN, East

The Shiawassee River at Owosso exceeded flood stage of 7 feet at 230 pm EDT on the 19th. The river crested at 7.1 feet at 5 pm, then fell back below flood stage at 9 pm.

The Shiawassee River at Fergus exceeded flood stage of 10 feet at 8 pm EDT on the 19th. The river crested at around 11 feet at midnight, then fell back below flood stage at 6 am on the 20th.

The River Raisin at Adrian exceeded flood stage of 13 feet at 1230 pm EDT on the 20th. The river crested at 13.3 feet at 7 pm, then fell back below flood stage at 4 am on the 21st.

Oakland County Madison Hgts

19	1330EST	0	0	120K	Lightning
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A stray thunderstorm caused a lightning strike that ignited a fire at a hotel.